

AMENDMENTS TO THE CLAIMS

Please replace all prior versions and listings of claims in the application with the listing of claims as follows:

1. (Previously Presented) An adjustment device for adjusting at least one control device with at least one control device microcontroller and with at least one control device debug interface, comprising:

at least one programmable unit;

at least one data transmission interface for connecting the adjustment device to an operating unit;

at least one adjustment device debug interface for connecting the adjustment device to the control device debug interface of the control device; and

at least one memory for at least one address list and at least one data list, where the addresses stored in the address list denote memory locations in the address space of the control device microcontroller and where with the use of the adjustment device debug interface data from the memory locations which are in the address space of the control device microcontroller and which are determined by the contents of the address list can be read and stored in the data list and/or the data stored in the data list can be stored at the memory locations which are in the address space of the control device microcontroller and which are determined by the contents of the address list.

2. (Previously Presented) The adjustment device according to claim 1, wherein the programmable unit comprises the adjustment device debug interface.

3. (Previously Presented) The adjustment device according to Claim 1, wherein the programmable unit is a programmable logic chip.

4. (Previously Presented) The adjustment device according to Claim 1, wherein the memory for the address list and for the data list is provided in the programmable unit.

5. (Previously Presented) The adjustment device according to Claim 1, wherein the programmable unit comprises a list application unit and by activation of the list application unit the list application unit automatically carries out either the calling of the data from the memory locations in the address space of the control device microcontroller and given in the address list and the storing of the called data in the data list or the writing of the data stored in the data list into the memory locations in the address space of the control device microcontroller and determined by the contents of the address list.

6. (Previously Presented) The adjustment device according to Claim 5, wherein in the case of several address lists and/or several data lists, by issuing priorities for the address lists and/or data lists a processing order can be determined by the list application unit.

7. (Previously Presented) The adjustment device according to Claim 5, wherein in the case of several address lists and/or several data lists a subset of address lists and/or a subset of data lists can be determined which is processed by the list application unit.

8. (Previously Presented) The adjustment device according to Claim 1, wherein the programmable unit comprises an individual application unit with which any memory locations in

the address space of the control device microcontroller can be read out and/or with which a value can be stored in any memory location in the address space of the control device microcontroller.

9. (Currently Amended) The adjustment device according to Claim 1, wherein the programmable unit ~~[[5]]~~ comprises a tool interface unit ~~[[15]]~~ for connecting at least one external device ~~[[16]]~~ to the adjustment device ~~[[1]]~~.

10. (Previously Presented) The adjustment device according to Claim 1, wherein the programmable unit comprises a bypass unit with an associated single-port or dual-port bypass memory, an associated bypass interface for connecting the bypass unit and the bypass memory to an external simulation unit, where data can be exchanged between the control device and the simulation unit with the use of the bypass memory and the bypass unit reading and writing bi-directionally.

11. (Previously Presented) The adjustment device according to claim 10, wherein the programmable unit comprises the bypass interface, where the bypass interface uses a serial data transmission and is embodied as an LVDS interface.

12. (Previously Presented) The adjustment device according to Claim 1, wherein the programmable unit comprises a prioritization and arbitration unit, where priorities can be assigned to the various units of the programmable unit via the prioritization and arbitration unit and the prioritization and arbitration unit determines, with the aid of the priorities assigned to the various units, the order of execution by activation of the various units among themselves and establishes a data connection between the unit activated in each case and the control device.

13. (Previously Presented) The adjustment device according to claim 12, wherein the priority of the bypass unit is higher than the priority of the list application unit and/or that the priority of the list application unit is higher than the priority of the individual value application unit and/or that the priority of the individual value application unit is higher than the priority of the tool interface unit.

14. (Previously Presented) The adjustment device according to claim 12, wherein the priority of the tool interface unit is higher than all the other units.

15. (Previously Presented) The adjustment device according to Claim 1, wherein, the adjustment device comprises a coordination unit which is connected via a coordination interface to one or more of the units of the programmable unit and/or via the data transmission interface to the operating computer and/or via the bypass interface to the simulation unit and/or to the bypass memory.

16. (Previously Presented) The adjustment device according to claim 15, wherein the coordination unit directs data or instructions coming from the operating computer and/or from the simulation unit to the addressed units of the programmable unit for further processing and/or transmits the data coming from a unit of the programmable unit to the operating computer and/or the simulation unit.

17. (Previously Presented) The adjustment device according to Claim 15, wherein the coordination unit provides received data with a time stamp which are transmitted to the operating unit.

18. (Previously Presented) The adjustment device according to Claim 15, wherein the coordination unit interprets configuration instructions coming from the operating unit and/or from the simulation unit and configures the adjustment device accordingly.

19. (Previously Presented) The adjustment device according to Claim 15, wherein the coordination unit registers external trigger signals and/or internal trigger signals and activates corresponding units of the programmable unit.

20. (Previously Presented) The adjustment device according to Claim 15, wherein the coordination unit is located in a separate computer unit outside of the programmable unit, in a microcontroller, in a programmable logic chip, or is formed as a part of the programmable unit.

21.-26. (Withdrawn)